

CLAIMS

What is claimed is:

1. A method, performed by a gaming system server, comprising:
performing an authentication routine of an executable gaming software program, by exchanging messages with a gaming terminal over a communication network, wherein the authentication routine results in a determination of whether a copy of the executable gaming software program stored at a gaming terminal is substantially identical to a copy of the executable gaming software program accessible by the gaming system server.
2. The method of claim 1, wherein performing the authentication routine comprises:
forming a first message digest, which includes an encrypted version of a first software program component combined with a seed value;
transmitting the seed value over a communication network to a gaming terminal;
receiving, from the gaming terminal, a second message digest, which includes an encrypted version of a second software program component and the seed value;
comparing the second message digest to the first message digest; and
authenticating the second software program component if the first message digest is substantially identical to the second message digest.
3. The method of claim 2, wherein forming the first message digest comprises:
generating the seed value by a random number generator;
appending the seed value to the first software program component to form a combined first software program, the first software program component assumed to be substantially equivalent to the second software program component; and

applying a cryptographic method to the combined first software program to form the first message digest.

4. The method of claim 2, wherein transmitting the seed value comprises transmitting the seed value over a virtual private network.

5. A method, performed by a gaming terminal, comprising:
receiving one or more authentication-related messages from a gaming system server over a communication network; and
sending at least one responsive message to the gaming system server, in response to receiving the one or more authentication-related messages, in order to enable the gaming system server to authenticate a copy of an executable gaming software program stored at the gaming terminal.

6. The method of claim 5, wherein receiving the one or more authentication-related messages comprises:
receiving a seed value over the communication network from the gaming system server.

7. The method of claim 6, further comprising:
forming a first message digest, which includes an encrypted version of the seed value combined with a first software program component within the gaming terminal; and
wherein sending the at least one responsive message includes transmitting the first message digest over the communication network to the gaming system server.

8. The method of claim 7, wherein forming the first message digest comprises:
appending the seed value to the first software program component to form a combined first software program; and

applying a cryptographic method to the combined first software program to form the first message digest.

9. The method of claim 7, wherein transmitting the first message digest comprises transmitting the first message digest over a virtual private network.

10. A method comprising:

a gaming system server forming a first message digest, which includes an encrypted version of a first software program component combined with a seed value;

transmitting the seed value over a communication network to a gaming terminal;

receiving, from the gaming terminal, a second message digest, which includes an encrypted version of a second software program component and the seed value;

comparing the second message digest to the first message digest; and

authenticating the second software program component if the first message digest is substantially identical to the second message digest.

11. The method of claim 10, wherein forming the first message digest comprises:

generating the seed value by a random number generator;

appending the seed value to the first software program component to form a combined first software program, the first software program component assumed to be substantially equivalent to the second software program component; and

applying a cryptographic method to the combined first software program to form the first message digest.

12. The method of claim 10, wherein transmitting the seed value comprises transmitting the seed value over a virtual private network.

13. The method of claim 10, wherein the gaming system server initiates taking the gaming terminal out of service when the first message digest is not substantially identical to the second message digest.

14. A method comprising:

receiving, by a gaming terminal, a seed value over a communication network from a gaming system server;

forming a first message digest, which includes an encrypted version of the seed value combined with a first software program component within the gaming terminal; and

transmitting the first message digest over the communication network to the gaming system server.

15. The method of claim 14, wherein forming the first message digest comprises:

appending the seed value to the first software program component to form a combined first software program; and

applying a cryptographic method to the combined first software program to form the first message digest.

16. The method of claim 14, wherein transmitting the first message digest comprises transmitting the first message digest over a virtual private network.

17. In a gaming system having a plurality of gaming devices interconnected by a communication network, a method comprising:

a first gaming device remotely authenticating a first software program component within a second gaming device that is remotely located from the first gaming device, wherein remote authentication is performed by selecting a seed value generated by a random number generator;

appending the seed value to a second software program component to form a combined second software program, the second software program component substantially equivalent to the first software program component;

applying a cryptographic method to the combined second software program to form a first message digest;

transmitting the seed value to the second gaming device having the first software program component;

receiving a second message digest from the second gaming device, the second message digest formed by applying the cryptographic method to a combined first software program component, the combined first software program component formed by appending the seed value to the first software program component;

comparing the second message digest to the first message digest; and

authenticating the first software program component if the first message digest is substantially identical to the second message digest.

18. The method of claim 17, wherein the first gaming device includes a server in a jurisdictional data center, and wherein the second gaming device includes a gaming terminal in a casino customer network.

19. The method of claim 17, wherein the first gaming device includes a server in a casino customer corporate center, and wherein the second gaming device includes a gaming terminal in a casino customer network associated with the casino customer corporate center.

20. A gaming system comprising:

a gaming system server, which performs an authentication routine of an executable gaming software program, by exchanging messages with a gaming terminal over a communication network, wherein the authentication routine results in a determination of whether a copy of the executable gaming software program

stored at a gaming terminal is substantially identical to a copy of the executable gaming software program accessible by the gaming system server; and

one or more gaming terminals, interconnected with the at least one gaming system server over the communication network.

21. A computer-readable medium having program instructions stored thereon to perform a method, which when executed within an electronic device, result in:

a gaming system server performing an authentication routine of an executable gaming software program, by exchanging messages with a gaming terminal over a communication network, wherein the authentication routine results in a determination of whether a copy of the executable gaming software program stored at a gaming terminal is substantially identical to a copy of the executable gaming software program accessible by the gaming system server.

22. A computer-readable medium having program instructions stored thereon to perform a method, which when executed within an electronic device, result in:

a gaming terminal receiving one or more authentication-related messages from a gaming system server over a communication network; and
sending at least one responsive message to the gaming system server, in response to receiving the one or more authentication-related messages, in order to enable the gaming system server to authenticate a copy of an executable gaming software program stored at the gaming terminal.